

WHAT IS CLAIMED IS:

1. An improved silicon steel structure, comprising an interior ring, an exterior ring concentrically arranged with the interior ring, a plurality of radially extending support bridges interconnecting an exterior edge of the interior ring and an interior
5 edge of the exterior ring, and a magnet absorbing surface attached to an exterior edge of the exterior ring.

2. The structure of Claim 1, wherein the exterior ring further comprises a pair of semi-circular rings.

3. An improved silicon steel structure, comprising a first and a second silicon
10 steel sheets stacked with each other, wherein each of the first and second silicon steel sheet comprises:

an inner ring;

an outer ring arranged concentrically with the inner ring;

a plurality of support bridges interconnecting the inner ring and the outer ring;

15 and

a magnetic absorbing surface attached to an exterior edge of the outer ring.

4. The structure of Claim 3, wherein each outer ring further comprises a pair of opposing semi-circular rings.

5. The structure of Claim 3, further comprising at least a third silicon sheet
20 inserted between the first and second silicon steel sheets.

6. The structure of Claim 5, wherein the third silicon sheet includes an inner ring, an outer ring concentrically arranged with the inner ring, and a plurality of support bridges interconnecting the inner and outer rings.

7. A set of coil, comprising:

25 a first silicon steel sheet and a second silicon steel sheet stacked with other, wherein each of the first and second silicon steels comprises:

an inner ring;

an outer ring arranged concentrically with the inner ring;

a plurality of support bridges interconnecting the inner ring and the outer ring; and

a magnetic absorbing surface attached to an exterior edge of the outer ring; and

5 a plurality of coils winding around the support bridges.

8. The set of coil according to Claim 7, wherein each of the coils has a vertical thickness smaller than a height of the magnetic absorbing surface.

9. The set of coil according to Claim 7, further comprising at least a third silicon sheet inserted between the first and second silicon steel sheets.

10 10. The set of coil according to Claim 9, wherein the third silicon sheet includes an inner ring, an outer ring concentrically arranged with the inner ring, and a plurality of support bridges interconnecting the inner and outer rings.

11. The set of coil according to Claim 9, wherein each of the coils has a vertical thickness smaller than a total height of the magnetic absorbing surface and the
15 thickness of the third silicon steel sheet.

12. A heat dissipating fan, comprising:

a blade wheel;

a magnet, mounted along an interior periphery of the blade wheel; and

a plurality of coil sets each further comprises:

20 a stack of silicon steel sheet, comprising a plurality of radially extending arms between a center and a periphery thereof;

a magnetic absorbing surface attached to a periphery of the stack and facing the magnet; and

a plurality of coils winding around the support bridges.

25 13. The fan of Claim 12, further comprising a plurality of blades extending radially from an exterior periphery of the blade wheel.

14. The fan of Claim 13, further comprising a shaft extending along a central axe of the blade wheel.

15. The fan of Claim 12, further comprising a shaft extending along a central
axe of the blade wheel.

16. The fan of Claim 14, further comprising a cap fitting over the shaft.

17. The fan of Claim 15, wherein the coil sets are installed between the cap
5 and the magnets.